

What is claimed is:

1. In a communication system comprising a plurality of modules, a method implemented by a communication coordinator on a particular module for selectively delivering a broadcast message, comprising:

5 receiving a broadcast message, said broadcast message being broadcasted by one of said plurality of modules to said plurality of modules including said particular module; determining whether there are any recipient components local to said particular module that should receive said broadcast message; and

10 in response to a determination that there is one or more recipient components for said broadcast message, delivering said broadcast message to said one or more recipient components.

2. The method of claim 1, further comprising:

15 in response to a determination that there are no recipient components for said broadcast message, foregoing delivery of said message.

3. The method of claim 1, wherein said broadcast message is a publication message, and wherein determining whether there are any recipient components comprises:

20 determining whether any components local to said particular module have subscribed to receive said publication message.

4. The method of claim 1, wherein said broadcast message is a publication message that has been published to a particular namespace, and wherein determining whether there are any recipient components comprises:

determining whether any components local to said particular module have  
5 subscribed to receive messages published to said particular namespace.

5. The method of claim 4, wherein said particular module comprises a subscribers table comprising one or more entries, each entry comprising a namespace specification and a reference to a subscribing component, and wherein determining  
10 whether any components local to said particular module have subscribed to receive messages published to said namespace comprises:

searching said subscribers table for an entry having a namespace specification that matches said particular namespace.

15 6. The method of claim 5, wherein searching said subscribers table comprises:

selecting a particular entry;

determining whether the namespace specification in said particular entry comprises a namespace expression having one or more wildcards; and

20 in response to a determination that the namespace specification in said particular entry comprises a namespace expression having one or more wildcards, performing a pattern matching operation to determine whether said namespace expression matches said particular namespace.

7. In a communication system comprising a plurality of modules, an apparatus residing on a particular module for selectively delivering a broadcast message, said apparatus comprising:

5 a mechanism for receiving a broadcast message, said broadcast message being broadcasted by one of said plurality of modules to said plurality of modules including said particular module;

a mechanism for determining whether there are any recipient components local to said particular module that should receive said broadcast message; and

10 a mechanism for delivering, in response to a determination that there is one or more recipient components for said broadcast message, said broadcast message to said one or more recipient components.

8. The apparatus of claim 7, further comprising:

15 a mechanism for foregoing, in response to a determination that there are no recipient components for said broadcast message, delivery of said message.

9. The apparatus of claim 7, wherein said broadcast message is a publication message, and wherein the mechanism for determining whether there are any recipient components comprises:

20 a mechanism for determining whether any components local to said particular module have subscribed to receive said publication message.

10. The apparatus of claim 7, wherein said broadcast message is a publication message that has been published to a particular namespace, and wherein the mechanism for determining whether there are any recipient components comprises:

a mechanism for determining whether any components local to said particular module have subscribed to receive messages published to said particular namespace.

11. The apparatus of claim 10, wherein said particular module comprises a subscribers table comprising one or more entries, each entry comprising a namespace specification and a reference to a subscribing component, and wherein the mechanism for determining whether any components local to said particular module have subscribed to receive messages published to said namespace comprises:

a mechanism for searching said subscribers table for an entry having a namespace specification that matches said particular namespace.

12. The apparatus of claim 11, wherein the mechanism for searching said subscribers table comprises:

a mechanism for selecting a particular entry;

a mechanism for determining whether the namespace specification in said particular entry comprises a namespace expression having one or more wildcards; and

a mechanism for performing, in response to a determination that the namespace specification in said particular entry comprises a namespace expression having one or more wildcards, a pattern matching operation to determine whether said namespace expression matches said particular namespace.

13. A computer readable medium comprising instructions which, when executed by one or more processors, causes the one or more processors to selectively deliver a broadcast message, said computer readable medium comprising:

5 instructions for causing one or more processors on a particular module to receive a broadcast message, said broadcast message being broadcasted by one of a plurality of modules in a communication system to said plurality of modules including said particular module;

10 instructions for causing one or more processors to determine whether there are any recipient components local to said particular module that should receive said broadcast message; and

instructions for causing one or more processors to deliver, in response to a determination that there is one or more recipient components for said broadcast message, said broadcast message to said one or more recipient components.

14. The computer readable medium of claim 13, further comprising:

instructions for causing one or more processors to forego, in response to a determination that there are no recipient components for said broadcast message, delivery of said message.

15. The computer readable medium of claim 13, wherein said broadcast message is a publication message, and wherein the instructions for causing one or more processors to determine whether there are any recipient components comprises:

instructions for causing one or more processors to determine whether any components local to said particular module have subscribed to receive said publication message.

5           16.     The computer readable medium of claim 13, wherein said broadcast message is a publication message that has been published to a particular namespace, and wherein the instructions for causing one or more processors to determine whether there are any recipient components comprises:

10           instructions for causing one or more processors to determine whether any components local to said particular module have subscribed to receive messages published to said particular namespace.

15           17.     The computer readable medium of claim 16, wherein said particular module comprises a subscribers table comprising one or more entries, each entry comprising a namespace specification and a reference to a subscribing component, and wherein the instructions for causing one or more processors to determine whether any components local to said particular module have subscribed to receive messages published to said namespace comprises:

20           instructions for causing one or more processors to search said subscribers table for an entry having a namespace specification that matches said particular namespace.

18.     The computer readable medium of claim 17, wherein the instructions for causing one or more processors to search said subscribers table comprises:

instructions for causing one or more processors to select a particular entry;

instructions for causing one or more processors to determine whether the namespace specification in said particular entry comprises a namespace expression having one or more wildcards; and

5 instructions for causing one or more processors to perform, in response to a determination that the namespace specification in said particular entry comprises a namespace expression having one or more wildcards, a pattern matching operation to determine whether said namespace expression matches said particular namespace.

10 19. In a communication system comprising a plurality of modules, a method for selectively delivering a broadcast message, comprising:

broadcasting, by a first module in said communication system, a broadcast message to a plurality of other modules in said communication system;

receiving, by each of said other modules, said broadcast message; and

15 processing, by each of said other modules, said broadcast message by:

determining whether there are any local components that should receive said broadcast message; and

in response to a determination that there is one or more local components that should receive said broadcast message, delivering said  
20 broadcast message to said one or more local components.

20. The method of claim 19, wherein processing of said broadcast message by each of said other modules further comprises:

in response to a determination that there are no local components that  
should receive said broadcast message, foregoing delivery of said  
message.

5           21.     The method of claim 19, wherein said broadcast message is a publication  
message, and wherein determining whether there are any local components that should  
receive said broadcast message comprises:

          determining whether any local components have subscribed to receive said  
publication message.

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          22.     The method of claim 19, wherein said broadcast message is a publication  
message that has been published to a particular namespace, and wherein determining  
whether there are any local components that should receive said broadcast message  
comprises:

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          determining whether any local components have subscribed to receive messages  
published to said particular namespace.

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          23.     The method of claim 22, wherein each of said other modules comprises a  
subscribers table comprising one or more entries, each entry comprising a namespace  
specification and a reference to a subscribing component, and wherein determining  
whether any local components have subscribed to receive messages published to said  
namespace comprises:



searching said subscribers table for an entry having a namespace specification that matches said particular namespace.

24. The method of claim 23, wherein searching said subscribers table

5 comprises:

selecting a particular entry;

determining whether the namespace specification in said particular entry

comprises a namespace expression having one or more wildcards; and

10 in response to a determination that the namespace specification in said particular entry comprises a namespace expression having one or more wildcards, performing a pattern matching operation to determine whether said namespace expression matches said particular namespace.

25. A communication system, comprising:

15 a first module; and

a plurality of other modules;

wherein said first module broadcasts a broadcast message to said plurality of other modules;

wherein each of said plurality of other modules receives said broadcast message;

20 and

wherein each of said other modules processes said broadcast message by:

determining whether there are any local components that should receive  
said broadcast message; and

in response to a determination that there is one or more local components  
that should receive said broadcast message, delivering said  
broadcast message to said one or more local components.

5           26.     The communication system of claim 25, wherein each of said other  
modules processes said broadcast message by further:

in response to a determination that there are no local components that  
should receive said broadcast message, foregoing delivery of said  
message.

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27.     The communication system of claim 25, wherein said broadcast message  
is a publication message, and wherein determining whether there are any local  
components that should receive said broadcast message comprises:

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determining whether any local components have subscribed to receive said  
publication message.

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28.     The communication system of claim 25, wherein said broadcast message  
is a publication message that has been published to a particular namespace, and wherein  
determining whether there are any local components that should receive said broadcast  
message comprises:

determining whether any local components have subscribed to receive messages  
published to said particular namespace.

29. The communication system of claim 28, wherein each of said other modules comprises a subscribers table comprising one or more entries, each entry comprising a namespace specification and a reference to a subscribing component, and wherein determining whether any local components have subscribed to receive messages published to said namespace comprises:

searching said subscribers table for an entry having a namespace specification that matches said particular namespace.

30. The communication system of claim 29, wherein searching said subscribers table comprises:

selecting a particular entry;

determining whether the namespace specification in said particular entry comprises a namespace expression having one or more wildcards; and

in response to a determination that the namespace specification in said particular entry comprises a namespace expression having one or more wildcards, performing a pattern matching operation to determine whether said namespace expression matches said particular namespace.